

## **OW Management Report**

### **Gold King Mine**

**August 14, 2015**

#### **Gold King Mine Release**

##### **Background:**

On August 5, while investigating the Gold King Mine in Colorado, an EPA cleanup team triggered a release of mine wastewater into Cement Creek. The EPA is working closely with responders and local, state and tribal officials to monitor water contaminated by the release. The release's path flows through three of the EPA's regions - Region 8 (Colorado, Utah, Southern Ute Tribe, and Ute Mountain Ute Tribe); Region 6 (New Mexico), and Region 9 (Navajo Nation). EPA has activated its Emergency Operations System to ensure coordination among its regions, laboratories and national program offices in Washington, D.C. The EPA has also set up an incident command center in Durango, CO. The EPA is coordinating with officials in Colorado, New Mexico, Utah, Southern Ute Tribe and Navajo Nation and the Ute Mountain Ute Tribe.

##### **Response Coordination:**

The EPA HQ EOC is now fully activated. Shifts will be 9:30 AM – 7 PM, Seven days a week. Kevin Tingley will staff the Water Desk through Saturday August 15. David Goldbloom-Helzner will staff the desk August 16, 17 and 20, and Brian Pickard will staff the desk August 18, 19 and 21.

##### **Press Release:**

From Durango, Colorado (excerpts here):

Durango, Colorado Sheriff Sean Smith has made the decision to open the river to recreational use. Sheriff Smith said, "My primary concern is the public health and safety of our community. In an abundance of caution, with the consultation of all our partner agencies, I issued the order to close the river to recreational uses on Thursday, August 6. With the release of preliminary results from the State Health Department and its accompanying recommendation, I am opening our river for recreation effective Friday, August 14, 2015 at noon with the health advisory."

While conditions in the Animas River today have been determined safe for recreational use, irrigation ditches that draw from the river currently are being flushed, and agricultural users should continue to exercise patience until this process is complete....La Plata County has flushed and allowed use of some irrigation ditches for watering crops such as wheat and alfalfa. The county is systematically working to reopen all ditches.

Gardeners who use water from the Animas River and grow leafy vegetables and root crops should call the CSU Extension office at 970-382-6463. Answers to questions about such crops are site-specific. The Colorado Department of Agriculture State Veterinarian's Office is confident that water from the Animas River can be used to water livestock. "The information we have received shows that water quality levels

are comparable to those prior to the spill,” said Dr. Carl Heckendorf, State Veterinarian for the Colorado Department of Agriculture.

### **EPA Activities:**

#### **Region 8:**

On Tuesday, samples from 19 of the 20 planned sediment sampling locations were completed by the EPA (contractor) sampling teams. No additional sediment samples were taken on Wednesday 8/12/2015.

Daily residential sampling is occurring. There were 20 private drinking water samples taken on 8/11/2015 with a total of 49 through the end of 2/11/2015. On 8/12, 36 private drinking water samples were collected, including duplicate quality control samples for a total of 80 wells that have been sampled. A system to prioritize and track water well sampling is under development.

#### Non-Potable water distribution as of 8-12:

Total deliveries: 22 (many are repeat deliveries), volume = 75,580 Gallons

Stakeholders: • Cattle & Horse Farms • Nursery • Fish Hatchery/Fish Ponds • Commercial organic produce farm • One operation, we have set up pumping and filtration from river to fill fish ponds.

#### Potable Water Delivery as of 8-12:

Total Deliveries: 6 (Repeats), volume = 29,000 gallons

Stakeholders: • Single Family Home cisterns. • Multiple family homes on neighborhood cistern.

1120 cases of bottled water have been purchased to hand out to community.

The CDPHE, and public water systems regulated by CDPHE in the impacted area, are taking raw and finished water samples to monitor water quality. CDPHE is coordinating with City of Durango drinking water treatment staff regarding the Animas River intake. It was not in use at the time of the event and has been off-line pending water quality assessment with CDPHE and completion of irrigation canal flushing.

CDPHE has 7 staff in area and continued collecting the Animas River surface water and sediment sampling. Also continued outreach to public water supply system operators.

Public system operators are continuing normal testing of their systems.

#### **Region 6:**

On August 13, 2015, NMED announced that they are considering removing advisories restricting water use in stages. Before NMED lifts the advisories, they would like see at least one more days' worth of validated data. NMED's initial target for lifting advisories is drinking water wells, followed by intakes, then recreational activities, and finally irrigation ditches.

#### Private Drinking Water Well Sampling:

EPA collected forty-two samples from private drinking water well locations on August 13, 2015.

The R6 EPA Incident Command and NMED Drinking Water Bureau focused efforts on getting water to the Town of Morningstar because their water supply is at critical levels. The Town reported only three to five days of supply remaining.

EPA received comments from NMED regarding the draft Sampling Plan and EPA will evaluate NMED's comments for inclusion in the final version.

On August 13, 2015, EPA received validated data for private drinking water well samples that were taken on August 10, 2015, and preliminary data for private drinking water well samples that were taken on August 11, 2015.

EPA is modeling the groundwater hydrology of the private wells.

#### Irrigation Ditch Sediment Sampling:

EPA collected twenty-nine irrigation ditch sediment samples today. Three of the twenty-nine samples were from critical locations and were couriered to the lab in Albuquerque. The courier was escorted by law enforcement to the laboratory to expedite sample receipt. EPA will receive preliminary data for these three priority samples on August 14, 2015. EPA will receive preliminary data on the remaining twenty-six samples on August 15, 2015.

#### Surface Water and Sediment Sampling:

EPA collected nine surface water and sediment samples on August 13, 2015.

EPA received validated data on August 13, 2015, for sediment samples that were taken on August 10, 2015, validated data for surface water samples that were taken on August 9 and 10, 2015, and preliminary data for surface water and sediment samples taken on August 11, 2015.

#### Agriculture and Livestock Water:

On August 13, 2015, EPA made deliveries to 6 agriculture and 3 livestock locations, totaling 298,683 gallons. Since August 11, 2015, EPA has made deliveries to 13 agriculture and 8 livestock locations, totaling 532,623 gallons. The limiting factor is the number of available trucks. We estimate 13 available trucks by the end of the week. San Juan County is coordinating loading points and logistics for staging and scheduling the trucks.

#### Region 9:

No information

#### Infrastructure Impacts:

#### Region 8:

System Name	Population	# Days Water Available
Durango, CO	23,000	Indefinite, using another source

Glacier Club, CO	525	Indefinite, using stored water and another source
No impacted systems in Utah, all have groundwater sources		

#### Region 6:

Based on conversation with the State of New Mexico and drinking water systems on August 11, 2015, the following is the list of affected water systems and their status:

System Name	Population	# Days Water Available
Aztec Domestic Water System	6800	10 days
Farmington Water System	47000	60 days
Lower Valley WUA	8428	6 days
Morningstar Water Supply System	6423	10 days*
Northstar WDWCA	4123	30 days
Southside Mutual Domestic	1593	3-5 days get water from Aztec
Upper La Plata WUA	2265	Get water from Aztec and Farmington
Flora Vista	4300	1 day/get water from Aztec
Total Population	80,392	

\* On 8/14/15 Regional call, Region 6 reported that Morningstar has only a 3-5 day supply, and is seeking connection with another system for more water

#### Region 9:

No information

**Sampling Results:** EPA has begun posting sampling results on the public website <http://www2epa.gov/goldkingmine>